



## **BROWNS GULCH PILOT RESTORATION/EDUCATION PROJECT 2007**

## **Step 1. Applicant Information and Project Summary Form**

1. **Name of Applicant(s)** Mile High Conservation District
2. **Project Title** Browns Gulch Pilot Restoration Project
3. **Type of Entity\*** State of Montana Conservation District  
(city, corporation, private individual, association, etc.)

(\***Corporation** and **Foundation** applicants are required to submit corporation information as follows: Articles of Incorporation, and Certificate of Good Standing. **Partnership** applicants are required to submit a Partnership Agreement and a list of the names of the Partners. **Limited Liability Company** applicants are required to submit Articles of Organization, a list of the members/managers, and Certificate of Good Standing. **Non-Profit Associations** are required to submit a list of members, Articles of Incorporation and Certificate of Fact. **Non-Profit Corporations** are required to submit a list of members, Articles of Incorporation and Certificate of Good Standing. Please attach these documents to this form.)

4. **Description of Project Location (Attach map showing location.)** This project is located on the Balentine Ranch on private property in the Browns Gulch Watershed.

5. **Injured Natural Resource(s) and/or Impaired Services to be Restored, Rehabilitated, Replaced or Equivalent Acquired through Project:** This proposed application is a small project grant to implement a pilot stream restoration project to be used for educational purposes in the Brown Gulch Watershed. Grant funds would be used to design and implement a stream restoration project that involves the revegetation of willows and other large woody species along approximately 850ft of Browns Gulch. This project would provide a restored section of stream to educate landowners on the importance of a healthy riparian habitat to fisheries, water quality, wildlife and range. The anticipated results would be to increase public awareness and participation in improving stream habitat and the benefits to both the watershed and the landowner.

6. 

<b>Authorized Representative:</b>	<u>Jack Kambich Chairman</u>	<u>Mr.</u>
	(Name)	(Title)
<b>Mailing Address:</b>	<u>P.O. Box 890</u>	
	(Street/PO Box)	
	<u>Whitehall, MT 59759</u>	<u>406-287-7875</u>
	(City/State/Zip)	(Telephone)
<b>Contact Person*:</b>	<u>Kris Hugulet</u>	<u>Ms.</u>
	(Name)	(Title)
<b>Mailing Address*:</b>	<u>P.O. Box 890</u>	

(Street/PO Box)  
**Whitehall, MT 59759**  
 (City/State/Zip)

Funding Source		Amount in (\$) Dollars					Matching Fund Percentage (Funding Source Total/Project Total)
		Committed Funds			Uncommitted Funds	Total	
		Grants	Non-Grant Funds				
			Cash	In-kind			
A.	UCFRB Restoration Fund	\$17,602.00				\$ 17,602.00	63.13%
B.	WRC			\$1,200.00		\$ 1,200.00	4.30%
C.	Project Partner Time			\$4,800.00		\$ 4,800.00	17.22%
D.	Volunteers			\$4,280.00		\$ 4,280.00	15.35%
E.							
F.							
G.							
H.							
I.							
Non-NRDP Totals		\$ 17,602.00		\$ 10,280.00		\$ 10,280.00	36.87%

8. **Estimated Total Project Cost** \$27,882.00  
 (Automatically Calculated from spreadsheet above)

**Phone:** \_\_\_\_\_

**E-mail Address:** jvmh@in-tch.com

(\*For Corporate, Partnership, L.L.C., or Cooperative Association applicants, list Registered Agent and Office for Service of Process)

**7. Proposed Funding Sources**

**9. Private (non-Governmental) Grant Applicant Financial Information**

- Are there any lawsuits, judgments, or obligations pending for or against you? No
- Have you ever declared bankruptcy? No
- Are any of your tax returns delinquent or under dispute? No
- Any unpaid deficiencies? No
- Are you a party to a lawsuit? No
- Do you have any other contingent liabilities? No
- Do your current and deferred liabilities exceed the value of your assets? No

**Explain all YES answers in a statement attached to this form.**

## 10. Certification for Individuals or Public Entities

### Certification for Individuals or Private Entities

I (We) the undersigned, have provided this financial information as part of my (our) application for a grant from the UCFRB Restoration Fund. I (We) certify that the statement is complete and accurate to the best of my (our) knowledge and I (we) authorize the State of Montana to investigate my credit worthiness and any of the matters described above.

Individual(s)

_____ Name	_____ Social Security No.	_____ Signature	_____ Date
_____ Name	_____ Social Security No.	_____ Signature	_____ Date

Social Security Numbers will be kept confidential.

Private Entities

_____ Name of Authorizing Agent	_____ Federal Tax ID No.	_____ Signature	_____ Date
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## 11. Authorizing Statement

### Grant Authorization

I hereby declare that the information included in and all attachments to this application are true, complete, and accurate to the best of my knowledge, and that the proposed project complies with all applicable state, local, and federal laws and regulations.

I further declare that, for Jack Kambich (Project Sponsor), I am legally authorized to enter into a binding contract with the State of Montana to obtain funding if this application is approved. I understand that the Governor must authorize funding for this project.

<u>Mile High Conservation District</u> Project Sponsor	_____ Date
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_____ Authorized Representative (signature)	_____ Title
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## **Step 2. Proposal Abstract**

### **Proposal Abstract**

**Applicant Name:** Mile High Conservation District

**Project Title:** Browns Gulch Watershed Pilot Restoration/ Education Project

### **Project Description and Benefits to Restoration:**

Browns Gulch is a 54,150 acre third order tributary of Silver Bow Creek, originating near the continental divide north of Butte, Montana. The area of Browns Gulch covered by this project was not directly impacted by historic releases of mine waste from ARCO or its predecessors. However, natural resources within the watershed including water quality, fishery, riparian, range, and forest health are degraded due to clearing of riparian vegetation, road siltation, competition from non-native species, absence of fire from the ecosystem, and presence of conifer blight. This grant allows for a pilot restoration/education project to promote restoration and encourage participation in conservation projects within Browns Gulch and surrounding watersheds. This planning effort includes coordination between the Browns Gulch Watershed Committee and MT FWP on wildlife and fishery management, NRCS on range management and noxious weeds, the WRC, MHCD and BGWC on outreach and education efforts. Grant Funds will be used to implement a pilot restoration/education project on private property in the upper portion of the watershed, to invest public support and involvement in riparian habitat and water quality restoration planning. The proposed project and education efforts target natural resource restoration that will directly benefit water quality and the health of natural ecosystems in the Upper Clark Fork River Basin.

### **Step 3. Technical Narrative**

#### **Technical Narrative**

**Applicant Name:** Mile High Conservation District

**Project Title:** Browns Gulch Pilot Restoration/Education Project

#### **A. Project Need and Definition**

The importance of Browns Gulch as a clean supply of water and as a refuge for the future reestablishment of a fishery in Silver Bow Creek are the basis for the need of this project. The Silver Bow Creek Restoration Plan (NRDP, 2005) specifically identifies the Browns Gulch watershed as a “very high” priority among the tributaries of Silver Bow Creek in need of fishery assessment and also identifies the headwaters of Browns Gulch as a high priority for restoring habitat for native westslope cutthroat trout. The Silver Bow Creek Restoration Plan also lists the quantity of water and seasonal dewatering of Browns Gulch as a high restoration importance and water quality concerns including siltation, nutrient loading, and temperature impairments as a moderate restoration priority for the greater Silver Bow Creek watershed.

The Browns Gulch Watershed Committee (BGWC), a group comprised of stakeholders in the Browns Gulch watershed provides local direction for watershed planning and conservation efforts. In 2003, the watershed committee in association with the Watershed Restoration Coalition of the Upper Clark Fork (WRC) and MHCD agreed that a comprehensive assessment was needed to understand and plan conservation work. An NRDP grant was requested to complete the assessment work. Funding was subsequently granted in 2004 for five resource areas identified including: stream flow and water quantity, management of invasive plant species, wildlife conservation and elk management, fishery enhancement, riparian health and water quality improvement. Assessment activities were undertaken in 2005 and a draft baseline watershed characterization report was completed by a professional contractor to the watershed committee in 2006. The Browns Gulch Watershed Baseline Report (KirK Engineering & Natural Resources, Inc., 2006) identifies current conditions and impacts to natural resources within Browns Gulch and proposes a watershed restoration strategy that includes the following components: 1) addressing stream dewatering and the need for increases in summer in-stream flow, 2) irrigation water management, 3) stream restoration and riparian corridor enhancement BMPs, 4) fishery enhancement, 5) nutrient management, 6) road surface improvements and BMPs, and 7) coordination and public outreach. Through pilot restoration and education, this project will address 6 of the 7 components listed above identified in the Browns Gulch Watershed Baseline Report.

#### **B: Project Goals and Objectives**

The main goal of this project is to create a pilot restoration project that would increase public awareness and promote public support and involvement in riparian habitat and water quality restoration planning. This project would focus on Browns Gulch residents, but also be an educational tool for surrounding watersheds and communities.

Several objectives need to be implemented to successfully achieve the desired goal.

1. Work collaboratively with the landowner and other partners in the project to ensure that objectives meet the desired goal.
2. Create a healthy riparian area that will demonstrate what habitat components are necessary to support a healthy fishery and increase water quality in a stream.
3. Work with local watershed groups and conservation districts to involve other area landowners and the community in the process and plan educational opportunities for the public.
4. Design and install an informational sign at the site, describing the project and its benefits.

This project would create both quantitative and qualitative results. Quantitatively, this project hopes to involve more landowners in the Browns Gulch watershed in restoration activities by educating them on the results and the importance of these efforts. Short term results are expected to visually show the importance of restoration activities to the stream. The goal is to have 5 landowners signed up for conservation projects over the next two years.

Qualitatively, it would enhance the stream in this section of the watershed by improving riparian habitat for fisheries, water quality and wildlife.

**B1&B2:** Current conditions of aquatic natural resources and noxious weed presence are described in detail in the Browns Gulch Watershed Baseline Report (KirK Engineering & Natural Resources, Inc., 2006). There is a high degree of certainty in the characterization of current conditions reported in the Browns Gulch Watershed Baseline Report as the methods of analysis used in that project followed up to date sampling and procedural protocols.

#### *Riparian Conditions and Stream Morphology*

Physical assessment reaches were completed as part of the Browns Gulch Watershed Baseline Report. Riparian health was assessed using the NRCS Riparian Assessment Method (Pick et al., 2004). Figures 1 and 2 in Appendix A show the results of this assessment. Major factors affecting riparian condition include land and water use management, road and irrigation infrastructure, and noxious weed infestation. Dominant impairments to riparian condition identified in the riparian assessment include channel incisement, bank instability and excessive lateral erosion, woody riparian vegetation clearing, heavy browsing and lack of reestablishment of woody vegetation, and absence of vegetation with a binding root mass. A majority of these impacts have been a result of poor livestock management due to limited education on proper range management and the importance of stream health. Woody vegetation clearing on this section of stream has occurred over time and reestablishment has not occurred due to poor livestock management and grazing practices.

There were three classifications identified in the physical assessments, *not sustainable*, *at risk and sustainable*. In the project area specific to this location, Browns Gulch is classified as functioning at risk. Impacts to the stream channel in this location include some bank instability, woody vegetation riparian clearing, heavy browsing, limited woody vegetation with binding root mass and lack of reestablishment of woody vegetation. Impacts at the project site are mostly a result of the amount of range available to the livestock operator, historic removal of willows riparian vegetation and trespass cattle from a Forest Service grazing lease.



## *Fisheries*

Although there has been no data collected specific to this particular project area, the Browns Gulch Baseline Watershed Report did conclude that fish populations in the Browns Gulch Watershed are dominated by non-native eastern brown trout (*Salvelinus fontinalis*). Fish Populations in general in the mainstem of Browns Gulch generally decline downstream. Native westslope cutthroat trout (*Oncorhynchus clarki lewisi*) are present only in the tributaries and in the upper reaches of the mainstem of Browns Gulch near and above Telegraph Gulch. Bull trout (*Salvelinus confluentis*) have not been found within the watershed in any of the fish surveys.

Currently, due to the relatively low numbers of westslope cutthroats within the Browns Gulch watershed, competition from non-native brook trout, and habitat degradation, the status of the cutthroat populations is considered tenuous. Notably, brook trout have a propensity to fare better than both westslope cutthroats in streams in which the naturally coarse substrate has been shifted towards silt and sand fractions. Fish habitat surveys have shown habitat to be degraded in all reaches surveyed. Both the number of pools per reach length and the quality of pools is less than expected given comparison to reference values given in Rosgen (1996). Stream channel pool frequency has been shown in habitat surveys to be associated with large woody debris (LWD) frequency. In general, many stream reaches within the Browns Gulch watershed have limited regeneration of woody species owing to clearing of riparian vegetation and heavy browsing by livestock and in some instances by wildlife. The lack of LWD and woody vegetation also limits channel cover, further limiting the quality of trout habitat.

B3. The main goal of this project is to create a pilot restoration project that would increase public awareness and promote public support and involvement in riparian habitat and water quality restoration planning. This project would focus on Browns Gulch residents and also be an educational tool for surrounding watersheds and communities.

Several objectives need to be implemented to successfully achieve the desired goal.

1. Work collaboratively with the landowner and other partners in the project to ensure that objectives meet the desired goal.
2. Create a healthy riparian area that will demonstrate what habitat components are necessary to support a healthy fishery and increase water quality in a stream.
3. Work with local watershed groups and conservation districts to involve landowners and the community in the process and plan educational opportunities for the public.
4. Design and install an informational sign at the site, describing the project and its benefits.

Desired future conditions include increased public awareness and involvement in restoration and water quality activities. Currently, much of the management of the stream corridor does not consider impacts to stream and riparian health. The expected outcome is that landowners and agricultural producers in the watershed will have access to information describing ways that the stream corridor can be managed to improve water quality while retaining livestock and hay productivity. The outcome of this project will be qualitatively measured by successful coordination of restoration and management efforts between the watershed committee and governmental and private entities involved, public outreach and landowner participation in riparian, range, and water quality restoration, and the implementation of a riparian restoration demonstration project that improves stream channel condition and fish habitat. As such, this is a small grant that could lead to additional projects developed during this planning stage. It is anticipated that project objectives will be achieved within the first year and continue over the next five years. Most of the factors contributing to the current condition would be addressed by



the project. Those factors include clearing of riparian vegetation, competition from non-native species and poor grazing management. Educating landowners on the impacts of these contributing factors is expected to increase awareness and involvement in restoration practices in the watershed. Landowners would also be informed on the requirements of the landowner to make this project possible, including, land restrictions, but also benefits to the landowner and overall stream health.

The primary benefit of the project would be education and public awareness on the benefits of stream restoration and water quality improvements and providing the means for landowners to learn how to properly manage their stream corridors. Increasing public awareness and involvement and providing the tools to help landowners implement learned restoration strategies, will benefit both the resource and preserve way of life in the valley. Secondary benefits include improvements to water quality and fisheries through stream enhancement from projects developed as a result of these educational opportunities. Although this is a secondary benefit, it will directly benefit the natural resources in Browns Gulch and hopefully, surrounding communities as well.

### **C. Project Implementation Plan and Time Schedule**

The proposed project is divided into 5 tasks listed below. The project implementation timeline assumes that funding will be available for spring 2008. The project is expected to be completed by December 2008. The overall approach to this project is to coordinate the pilot restoration project with public outreach and education efforts throughout Browns Gulch and surrounding communities. The public outreach and education efforts will be a collaborative effort between local watershed groups, landowners, agencies and conservation districts to encourage participation in restoration activities and water quality improvements.

1. During January through March of the project, the watershed coordinator will work with the landowner (Cam Balentine), NRCS, Fish, Wildlife and Parks and NRDP to design and implement a revegetation strategy that would result in a small scale riparian restoration pilot project approximately 1700 ft (850ft each side) in length. Fish Wildlife and Parks will be consulted on the approximate percentage of vegetation cover required to provide shade and habitat complexity for fish and other aquatic species. NRCS will work with the landowner to help design a grazing management and water use plan that will allow the landowner to exclude the project area from production and water use for 3 to 5 years, depending on the amount of increased stream bank stabilization and plant health and vigor. NRCS and the landowner will agree to a plan on when and how the area is grazed. NRDP will be asked to participate and approve the vegetation plan before planting occurs to ensure the grant requirements are fulfilled.

Also during this time period a specific education plan for the project would be developed that would define specific objectives and tasks needed to achieve the educational components of this project. This education plan would be a collaborative effort between the partners and approved by NRDP.

During this time period several tasks will occur that include detailed project planning and tasks that will help ensure the success of the project.

Task 1: Work with NRCS to design and contract a riparian grazing management system that will address the next 10 years of management

Task 2: Work with NRCS to develop off site water if needed to replace lost water sources as a result of the project.

Task 3: Coordinate with the NRCS and Mile High Conservation District to develop a noxious weed plan for the participating landowner and apply for 2008 EQIP grants.

Task 4: Plan outreach and educational strategies (including a written education plan) for the project area that involves a collaborative process between all the partners. Specific strategies include:

- 1) Three to five site visits and tours with landowners, conservation districts and community members.
- 2) Give presentations at various community organizations discussing different components of a healthy riparian system and why they are important not only to the resource, but to the landowner as well.
- 3) Install a sign at the project site to inform people that this area is a pilot restoration/education project and the various partners.

Task 5: Finalize plans with the University of Montana about volunteer numbers and time commitments. Also, work with Browns Gulch residents to secure some of their time as volunteers.

1. From March through September actual implementation of the project will occur. Implementation will require the following tasks to be successfully completed.

Task 6: Plant 1700 feet (850ft each side) of bank with various sizes of willow stock in designated locations.

Task 7: Set up photo monitoring sites

Task 8: Install the riparian fence along approximately 200ft of stream

Task 9: Work with partners to implement the planning strategies discussed above.

2. The time period of September through December will be spent writing progress reports and planning for next years outreach and education efforts. Time will also be spent getting feedback from partners and landowners on the project and possible improvements and lessons learned for following years.

3. The only hired staff related to this project will be the Upper Clark Fork Watershed Coordinator. All other partners in the planning and implementation of this project are paid for by their agency or organization as part of their normal operating budget or have volunteer status. However, it will require the technical expertise of several partners to effectively and successfully implement the proposed project. The coordinator is expected to spend approximately 96 hours total on the project throughout 2008.

4. Contracted services will include a stream restoration specialist to design a planting strategy for the project site and a fence contractor to install the riparian fencing. Services of the restoration specialist is expected to require minimal time, approximately 24 hrs. This will be done by a professional vegetation/stream specialist that has a unique understanding of stream morphology and riparian vegetation. The other contracted service is a fence contractor to install the riparian fence.

5. The only permit required for the project will be a Montana Stream Protection Act Permit (124permit). This permit will be applied for in the spring to ensure adequate time for FWP compliance. There will be an agreement signed between the landowner and the conservation district that allows for a specified number of tours and educational classes per year at the project site.

6. It is anticipated that this project will be a catalyst for larger restoration project in the Browns Gulch watershed. By demonstrating the need for restoration and the benefits it provides, the conservation district and other partners hope to expand their landowner participation and develop watershed wide restoration plans. Some of these plans are already in the works with other landowners in the watershed. Funding will be sought on a project by project basis.

7. To ensure long-term effectiveness of the project, an agreement will be signed either with the NRCS or FWP to ensure that the new grazing management plan is followed and fencing is maintained. The conservation district along with the WRC has agreed to follow through with the outreach and education for the project.

#### **D. Project Time Table**

<b>Task</b>	<b>Month</b>	<b>Year</b>
Signed landowner agreement	Jan	2008
Work with landowner and NRCS to develop grazing plans	Jan-Feb	2008
Develop noxious weed plan and apply for 2009 EQIP	Feb-March	2008
Submit 124 Permit	Feb	2008
Plan outreach and educational strategies	Jan-March	2008
Plant vegetation along bank	April or May	2008
Set up monitoring	May	2008
Install riparian fencing	May	2008
Write final report	September-October	2008
Project Completion Date	December	2008

#### **E. Methods and Technical Feasibility**

No special or unique methods or technical feasibility analysis is required for this project. The field and engineering methods used will follow common approaches used on similar projects for revegetation of riparian areas and livestock exclusion.

Outreach work will be completed as similar public meeting and public interaction have been led by the Browns Gulch Watershed Committee and the contracted support services. Advertising, public service announcements, posters, and news releases will be used to promote public meetings.

#### **F. Monitoring Plan**

The monitoring plan will consist of staked photo points that can be taken yearly to monitor qualitative and quantitative measurements of vegetation. Photo points should indicate the health of the vegetation and the percentage of cover it will provide to the stream over subsequent years. A lack of growth or plant mortality will be indicated through photos. If project revegetation goals are not being met, an alternative plan that addresses alternatives for achieving the desired goals will be developed and implemented.

A monitoring strategy for the educational portion of this project would also be developed as part of the monitoring plan. This strategy would include a set of questions and discussion points that would be discussed before and after project implementation to gauge the participants' knowledge of specific restoration techniques and the value of binding root mass for providing stream bank stability and the importance of this habitat to fisheries, wildlife and other aquatic species. Specific questions and discussion points would be determined and written during the development of the education plan.

#### **G. Qualifications of the project Team**

*Renee Myers*- Upper Clark Fork Watershed Coordinator

Renee has worked in the hydrology field for the past 10 years on various watershed projects throughout western Montana. She has very diverse skills in several other disciplines including fisheries, soils, weeds, management, report writing and education. Her broad based knowledge of watershed projects will be very beneficial in the development and implementation of the proposed project.

The other partners on the project team include the NRCS, FWP, University of Montana, WRC, Browns Gulch Watershed Committee and the Mile High Conservation District. The qualifications of the NRCS, FWP and University of Montana are self explanatory. The Browns Gulch Watershed Committee, WRC and the Mile High Conservation District have the support of the community and rapport with the landowners needed to successfully coordinate public outreach and education efforts for the project. Each entity has successfully developed and implemented outreach efforts with the community and landowners on several projects. The Mile High Conservation District will be the financial sponsor of the project and are qualified to administer grants and contracts.

#### **H. Supporting Technical Documentation**

Kirk Engineering & Natural Resources, Inc. 2006. Draft Brown Gulch Watershed Baseline Report. Submitted to MHCD and NRDP August 2006.

NRDP, 2005. Silver Bow Creek Watershed Restoration Plan (Final). State of Montana Natural Resource Damage Program.

Pick, T., Husby, P., Kellogg, W., Leinard, B., Apfelbeck, R. 2004. Riparian Assessment, Using the NRCS Riparian Assessment Method. NRCS, Bozeman, MT, <http://www.mt.nrcs.usda.gov/technical/>.

Rosgen, D.L. 1993. Applied fluvial geomorphology, training manual, river short course, Wildland Hydrology, Pagosa Springs, CO, p450.

Rosgen, D. 1996. Applied Stream Morphology. Wildland Hydrology: Pagosa Springs, CO.

## **Step 4. Criteria Statements**

### **Criteria Statements**

**Applicant Name:** Mile High Conservation District

**Project Title:** Browns Gulch Pilot Restoration/Education Project

#### **Criteria 1: Relationship of Expected Cost to benefit**

The total cost of this project is \$27,882.00, of which the NRDP is requested to fund \$17,602.00. The cost share is estimated at \$10,280.00. The NRDP will fund approximately 63% of the project and matching funds will constitute approximately 37% of the project budget. The expected benefits include the development and implementation of a pilot restoration/education project that will promote public awareness and participation in future restoration and conservation efforts in the valley and more specifically Browns Gulch. The benefits of the project are invaluable to the public, because it will directly show benefits of healthy riparian system to both the watershed and the landowner. Successful implementation of this project is anticipated to be a catalyst for other landowners developing restoration projects on their properties, which would have a direct benefit to the injured resources of Browns Gulch and potentially streams in other watersheds. Indirectly, this project will hopefully reach community members and other organizations to be used as an education tool for restoration projects.

#### **Criteria 2: Cost Effectiveness**

There are three alternatives for this project. Alternative 1 would involve no public outreach and education to landowners and community members to promote restoration and conservation strategies in Browns Gulch. If there is no education to landowners on the importance of stream restoration activities, then the likelihood of landowners signing up for specific restoration and conservation activities that lead to restoration are unlikely. Landowners need to be shown that there is a benefit to their operation if they are going to participate.

Alternative 2 would be to contract out all the services including outreach and education, planting of riparian vegetation, fence installation and project development and management to a consulting firm. This alternative is expensive and will not promote landowner and community participation in the process that is tied to the educational objectives of this project. The additional cost to contract out all services would be approximately \$11,822.00.

Alternative 3, the preferred alternative, is to contract out minimal design and project management hours. All the planting would be completed by volunteers in the Gulch and surrounding communities as well as the University of Montana, NRCS, WRC, Browns Gulch Watershed Committee, Mile High Conservation District and other partners. Alternative 3 provides approximately 37% of the cost of the project as in-kind services that will be volunteer time. This alternative would accomplish the goals of the project by promoting landowner outreach and education through volunteers participation. This involves participants from the start of the process and allows them to physically see the changes and improvements over time and the benefits it has to the stream.

**Criteria 3: Impacts to the Environment and Human Health and Safety**

The majority of this project involves coordination and education activities. The riparian enhancement demonstration project involves shrub planting and streambank stabilization using hand tools. Standard safety guidelines for manual labor with hand tools will be followed. The demonstration project will be designed to limit any disturbance to and promote regeneration of native riparian species; therefore, no impacts to the environment are expected.

**Criteria 4: Public Support**

Public support for the proposed project has been discussed at several Browns Gulch Watershed Meetings as well as with all the partners. All partners involved, including Browns Gulch landowners on the conservation district and WRC have given full support of the project and feel it is a necessary step in educating the landowners on restoration benefits and opportunities. Support letters from the partners will follow this application.

**Criteria 5: Public Access**

Public access is not relevant to this planning project with the exception of public access to view the demonstration project. The private landowner has agreed to several site tours and other educational opportunities at the project site if they should arise. There will be a signed agreement with the landowner stating the amount of public access days.

## **Step 5. Proposed Budget**

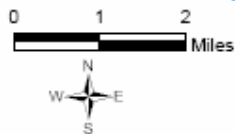
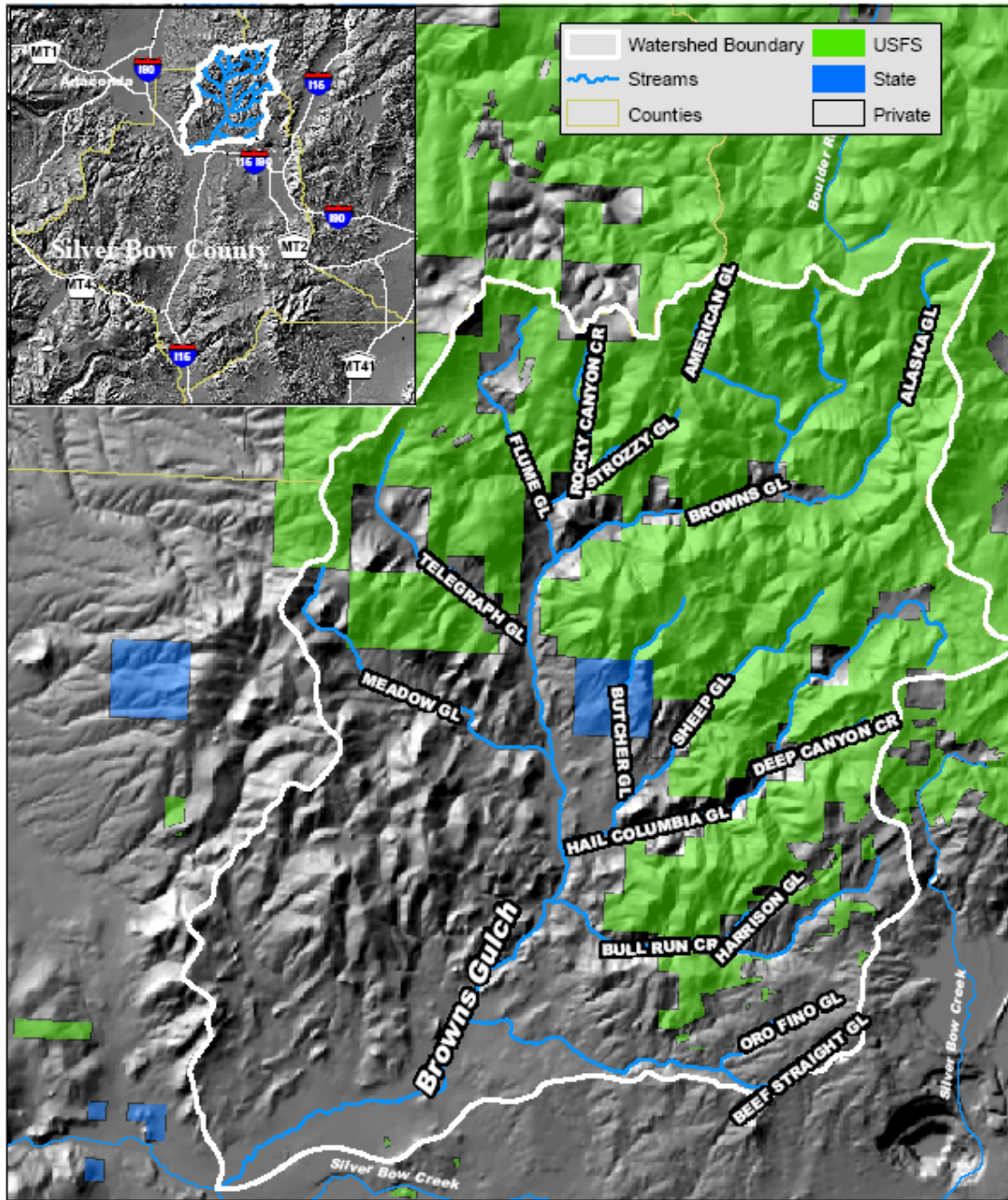


2007 Application		BUDGET DETAIL FORM							
EXPENSE CATEGORY		UCFRB RESTORATION GRANT FUND	APPLICANT CONTRIBUTION			OUTSIDE SOURCES			TOTAL
			Cash	In-Kind	Subtotal	Cash	In-Kind	Subtotal	
1	SALARIES AND WAGES (List all worker salaries)								
	Project Manager								
	Coordinate with partners on outreach and education	\$1,200.00					\$800.00		
	Project development and on-site project management	\$1,200.00							
	Public Meetings and Tours	\$480.00					\$160.00		
	Project Administration 10% of total	\$1,524.00							
	Partner Times for meetings (development and implementation)						\$4,800.00		
	Insert Row								
	SALARIES AND WAGES SUBTOTAL	\$ 4,404.00					\$ 5,760.00	\$ 5,760.00	\$ 10,164.00
2	FRINGE BENEFITS								
	Insert Row								

	FRINGE BENEFITS SUBTOTAL								
3	CONTRACTED SERVICES (LIST BY TYPE)								
	Stream vegetation design	\$1,560.00					\$240.00		
	Travel for contractor	\$133.50							
	One day in the field to coordinate and stake planting sites	\$520.00							
	Insert Row								
	CONTRACTED SERVICES SUBTOTAL	\$ 2,213.50					\$ 240.00	\$ 240.00	\$ 2,453.50
4	SUPPLIES AND MATERIALS								
	Erosion matting 70/30 coco-straw (7.5'X120')	\$680.00							
	Riparian grass seed mix	\$1,000.00							
	Stakes	\$72.00							
	Tree/Shrubs 1 gallon	\$2,762.50					\$1,500.00		
	Small plants 10" containers	\$200.00					\$1,500.00		
	Fence Material \$2.00 ft/ ft	\$4,400.00							
	Cutting and planting of willow slips						\$1,280.00		
	Insert Row								

	SUPPLIES AND MATERIALS SUBTOTAL	\$ 9,114.50					\$ 4,280.00	\$ 4,280.00	\$ 13,394.50
5	COMMUNICATIONS								
	Public Outreach fliers/publications	\$500.00							
	Insert Row								
	COMMUNICATIONS SUBTOTAL	\$ 500.00							\$ 500.00
6	TRAVEL								
	Travel to and from project site and meetings	\$534.00							
	Insert Row								
	TRAVEL SUBTOTAL	\$ 534.00							\$ 534.00
7	RENT AND UTILITIES								
	Insert Row								
	RENT AND UTILITIES SUBTOTAL								
8	EQUIPMENT								
	Insert Row								
	EQUIPMENT SUBTOTAL								
9	MISCELLANEOUS								

Fencing Contingencies 10%	\$440.00							
Plant mortality contingency	\$396.00							
Insert Row								
MISCELLANEOUS SUBTOTAL	\$ 836.00							\$ 836.00
ALL CATEGORIES SUBTOTAL	\$ 17,602.00					\$ 10,280.00	\$ 10,280.00	\$ 27,882.00



### Browns Gulch Watershed Project Location

**Kirk**   
Engineering & Natural Resources, Inc.  
2110 Euclid Avenue  
Helena, MT 59601



# Appendix A

Figure 1

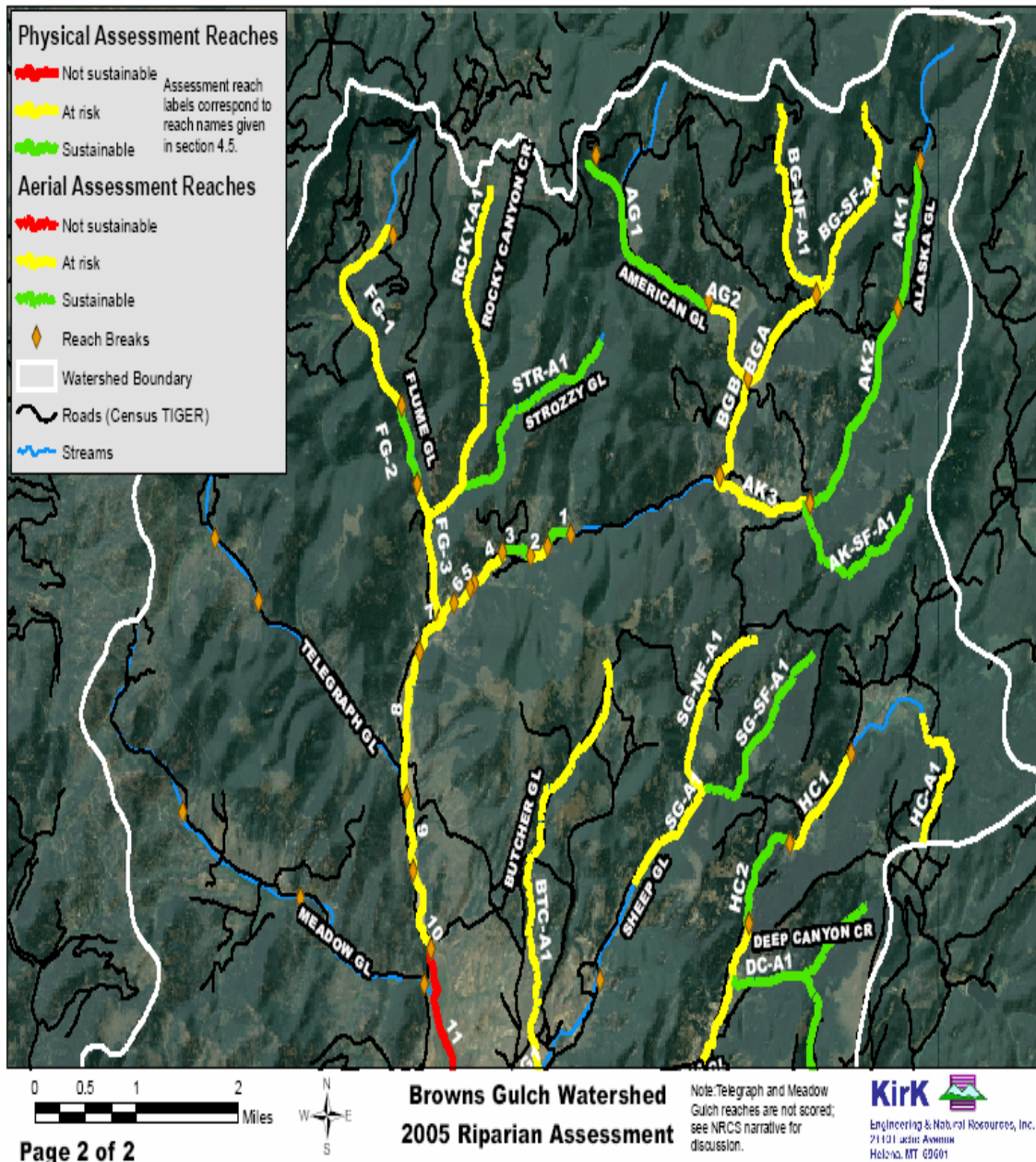
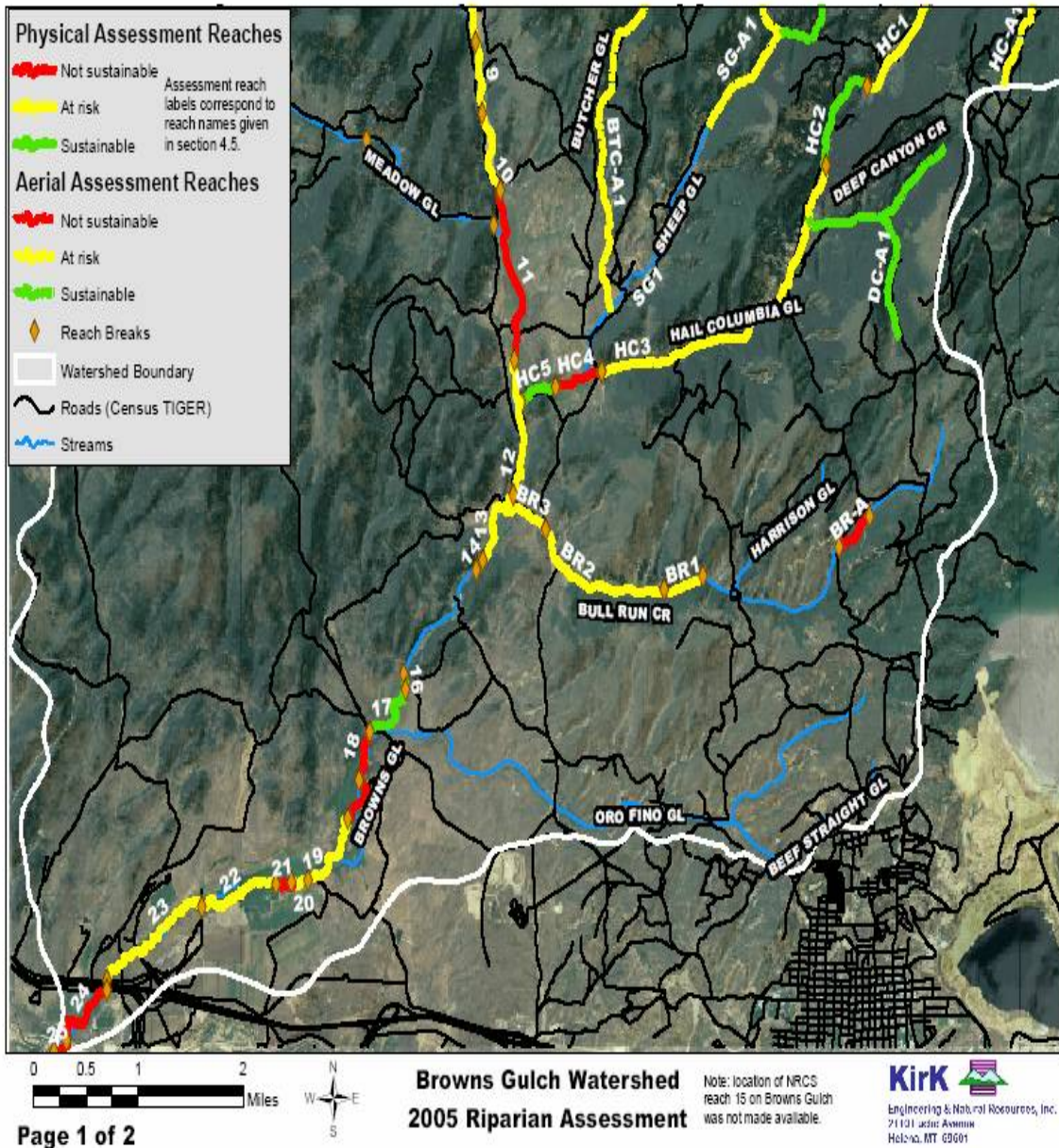


Figure 2





## Appendix B Photos

Photo 1





Photo 2





Photo 3





Photo 4

